

SAPOZHNIKOV, R.M.

32-6-37/54

AUTHOR
TITLE

VITAL', D.A., TEL'TOVT, M.I., SAPOZHNIKOV, R.M.
Control System for Thermal Analysis.

(Pul't upravleniya ustanovki dlya termicheskogo analiza.-
Russian)
Zavodskaya Laboratoriya, 1957, Vol 23, Nr 6, pp 748-749
(U.S.S.R.)

PERIODICAL

ABSTRACT

This system makes it possible to maintain a constant heating velocity and it can be switched off as soon as the required temperature is attained. An automatic heater is mounted on a textolite base together with a panel and a casing. The electric motor drives a toothed disk which moves round a semicircle within 1 1/2 hours. Voltage is increased by a contact which also increases the temperature in the furnace. The tumbler of the automatic heater has two functions: By operating a lever the motor is switched on and, at the same time, the toothed disk is connected. A terminal switch breaks contact as soon as the required voltage is attained. The front panel contains the following instruments:
A pointer of the autotransformer with a circular scale, the tumbler switch of the automatic heater, the pointer of the terminal switch, a signal lamp, the tumblers for the illumination of the galvanometers, and the thermocouple switch.

CARD 1/2

SAPOZHNIKOV, S. A.

"The Thermal Balances of the Active Surface in the Principal Geographical Zones of the USSR," Trudy Vassoy. geograf. s'yozda (Works of the Second All-Union Geographical Conference, No 2, 1948.

САПОЖНИКОВ, S.A., doktor geograficheskikh nauk, professor

~~SAPOZHNIKOV, S.A.~~
Climatology and its practical application. Meteor.i gidrol. no.1:
11-16 Ja '52. (MIRA 8:9)

1. Glavnaya geofizicheskaya observatoriya im. A.I.Voyeykova, Lenin-
grad.

(Climatology)

SAPozhNIKOV S. A.

50-2-21/22

AUTHOR: Buchinskiy, I. Ye.

TITLE: Meeting of the Meteorology and Climatology Section
of the Scientific Technical Council of the Main
Administration of Hydrometeorological Service
(Zasedaniye sektsii meteorologii i klimatologii Nauchno-
tekhnicheskogo soveta GUGMS)

PERIODICAL: Meteorologiya i Gidrologiya, 1958, Nr 2, pp. 60-60 (USSR)

ABSTRACT: On October 22nd, 1957, a large-scale meeting took place in the geophysical main observatory. Representatives of several institutes of the Sovietic AN, of the Ukrainian and of the Kazakh Scientific Research Institutes for Hydro-meteorology and others took part in it. A lecture on the theme "The Situation and the Chances of the Research of Climatic Fluctuations" was held by professor S. A. Sapozhnikov. In this lecture it was pointed out that the importance of the investigation of the climatic fluctuations in long-term intervals increases more and more for the purposes of the hydrometeorological service. The investigation of these fluctuations is necessary for

Card 1/2

Meeting of the Meteorology and Climatology Section
of the Scientific Technical Council of the Main Administration
of Hydrometeorological Service

50-2-21/22

climatological forecasting. It was found that also the forecasting interrelations are changed in parallel with the climatic fluctuations during long periods. Furthermore it is necessary to investigate the humidity fluctuations in the arid zones of the USSR. The investigation of the rules governing the climatic fluctuations is especially important for economic planning at long sight. In the decisions of this meeting also the problems of methodical agreement of the elaboration of data and a vast application of an automatical elaboration of the meteorological observations were treated.

AVAILABLE: Library of Congress

Card 2/2

L 23376-65 EWT(1)/FCC GW

ACCESSION NR: AR5002525

S/0169/64/000/010/B054/B054

SOURCE: Ref. zh. Geofizika, Abs. 10B330

AUTHOR: Sapozhnikov, S. A.

TITLE: Methods for approximate calculation of the number of days and hours with high air temperature

CITED SOURCE: Tr. N.-i. in-ta aeroklimatol, vyp. 11, 1963, 24-34

TOPIC TAGS: temperature extreme, air temperature, minimum air temperature, maximum air temperature, climate

TRANSLATION: Six indices can be found in world climatological summaries for analysis of the temperature regime of foreign areas: mean maximum, mean absolute maximum, absolute maximum, mean minimum, mean absolute minimum and absolute minimum. A method is proposed for approximate computation of the number of days and hours with a high temperature on the basis of the above-mentioned indices.
I. D.

JB CODE: ES

ENCL: 00

Card 1/1

SAPOZHNIKOV, V.

Foremost driver. Avt. transp. 36 no. 6:10 Ja '58.

(MIRA 11:7)

1. Nachal'nik Sretenskoy avtotransportnoy kontory.
(Highway transport workers)

ANASTASIYEV, B.I., inzh.; MIROV, B.M., inzh.; SAPOZHNIKOV, V.A., inzh.;
LEBEDEV, N.N., inzh.

Automatic measurement of the length and output of pipes. Mekh.i
avtom.proizv. 16 no.8:5-7 Ag '62. (MIRA 15:9)
(Electronic measurement)

ANASTASIYEV, B.I., inzh.; YEREMIN, V.M., inzh.; KOZLOV, D.T., inzh.; MIROV,
B.M., inzh.; SAPOZHNIKOV, V.A., inzh.; ROMANOV, V.G., inzh.

Automatic unit for measuring pipe length. Mekh. i avtom. proizvod.
19 no.3=7-9 Mr '65. (MIRA 184)

ANASTASIYEV, B.I., inzh.; MIROV, B.M., inzh.; NEYSHTADT, G.A., inzh.;
SAPOZHNIKOV, V.A., inzh.

Transmission of discrete information for converter smelting
control. Mekh. i avtom. proizvod. 19 no.4:49-50 Ap '65. (MIRA 18:6)

L 7881-66 EWT(m)/ETC/EWG(m)/EWP(j)/EWA(h)/EWA(l) DS/RM

ACC NR: AP5025015

SOURCE CODE: UR/0286/65/000/016/0079/0079

AUTHORS: Kozhevnikova, N. Ye.; Mochalova, O. A.; Pashkov, A. B.; Sapozhnikov, Y. B.; Slabkaya, L. D.

ORG: none

TITLE: A method for obtaining anion exchangers. Class 39, No. 173924/announced by State Scientific Research Institute for Plastics (Gosudarstvenny nauchno-issledovatel'skiy institut plasticheskikh mass)

SOURCE: Byulleten' izobreteniy i tovarnykh znakov, no. 16, 1965, 79

TOPIC TAGS: anion exchanger, copolymer, styrene, divinylbenzene, plastic, ion exchange, resin

ABSTRACT: This Author Certificate presents a method for obtaining anion exchangers on the basis of chloromethylated copolymer of styrene and divinylbenzene. To increase the radiation stability of the anion exchangers, the copolymers are treated with trialkylstilbines during heating.

SUB CODE: 07/ SUBM DATE: 22Jun64

nw

Card 1/1

UDC: 541.183.123.3:678.746.22

SAPOZHNIKOV, V.F.; BERNSHTEYN, S.A.

The thermal electric power plants should be assembled like an automobile. Izobr.i rats. no.12:3-5 D '61. (MIRA 14:12)

1. Ministerstvo stroitel'stva elektrostansiy.
(Electric power plants)

SAPOZHNIKOV, V.F.

With the help of the community. Zashch. rast. et vred. 1 bol. 6
no.10:51 0 '61. (MIRA 16:6)

1. Nachal'nik Samarkandskoy karantinoy inspektsii.
(Samarkand Province—Plant quarantine)

PA 34/4911

SAPOZHNIKOV, V. I.

USSR/Medicine - Blood Transfusion, May/June 48

Complications and
Sequels
Medicine - Blood, Groups

"The Reality of the Danger of Blood Transfusion
During Childbirth Due to Incompatibility of
Rh Factor," V. I. Sapozhnikov, M. A. Umova,
Uterological Clinic, Moscow Med Inst, Min Pub
Health RSFSR, Serological Lab, Gen Inst of
Hematol and Blood Transfusion, 6 pp

"Akusher i Ginekol" No 3

34/4911

USSR/Medicine - Blood Transfusion, May/June 48
Complications and
Sequels (Contd)

Explains significance of Rhesus factor. De-
scribes three cases in which blood transfusion
during childbirth had fatal results.

34/4911

SAPOZHNIKOV, V.

SAPOZHNIKOV, V. [

[The female organism and its functions] Zhenskii organizm i ego
deiatel'nost'. Moskva, In-t sanitarnogo prosveshchenia, 1949.
15 p. (MLRA 7:5)
(Women—Anatomy and physiology)

SAPOZHNIKOV, V.I.

Results of the use of anti-influenza type A-2 and B monovaccine during the interepidemic period. Kaz. med. zhur. 4:58-59 J1-Ag'63 (MIRA 17:2)

1. Kafedra epidemiologii (zav. - dotsent I.P.Sakulin) Sverdlovskogo meditsinskogo instituta.

SAPOZHNIKOV, V.I.

3

USSR.

6.3-282

551.579:551.509.5

Sapozhnikov, V.I. Opyt prognoza gidrografa povodka po summarnomy pritoky vody v
~~essentnyy~~ forecasting the flood hydrograph by means of the total runoff in
the river system, Leningrad. Tsentral'nyi Institut Prognozov, Trudy 12(39)
1961, 1969. 8 figs., 4 tables, 8 refs., 3 eqs. DLG-Study based on the
theoretical short range flood forecasting method of KALININ (see Ibid., 9 (36),
1961), based on the equation of water balance and using the time of maximal
runoff in the hydrograph as the main parameter. The hydrograph itself is
represented by a trigonometric series (17). The author gives a number of detailed
examples, with comparing following runoff with the forecast and actual
runoff. Subject headings: 1. Runoff forecasting; 2. Hydrographs 3. U.S.S.R.
- A.A.

AE

SAPOZHNIKOV, V.

3

551.570.4:551.588.6
 ✓ 5.7-168 Ivanov, I. V. and Sapozhnikov, V. I. K analizu vliyania zalesennosti bassaina na vysochu vozennogo potokov'ia. [See analysis in the influence of the forestation of a basin on the level of spring high waters.] *Meteorologiya i Gidrologiya*, No. 6:36-38, 1952. 2 figs., 3 refs. DLC—
 Report on further investigations (see item 3.6-151, June 1952, MAB) made on the influence of forested river basins on the flood runoff. The author presents graphs of interrelation between daily runoff and the degree of basin forestation. The maximum decrease of flood runoff was observed in regions with about 60% forest which is equal to about 25% of runoff formed over the forest free basin. The duration of floods is longer in the forested area. Subject headings: 1. Forest influences 2. Runoff 3. Spring floods.—N.T.Z.

graphs 2

file

SAPOZHNIKOV, Y.I.; SOLOV'YEV, N.I.; MEZHERITSKAYA, N.P., tekhnicheskiy
redaktor.

[Exploit of the Baltic fleet in 1918] Podvig baltitssev v 1918 godu.
Moskva, Voennoe izd-vo Ministerstva oborony Soiuza SSR, 1954. 97 p.

(MLRA 8:1)

(Russia--History, Naval) (Russia--Revolution, 1917-1921)

SAPOZHNIKOV, V. I.

AID P - 1435

Subject : USSR/Meteorology and Hydrology

Card 1/2 Pub. 71-a - 9/23

Author : Sapozhnikov, V. I., Kandidat of Tech. Sciences

Title : Forecasting of the monthly discharge of Volga River at Kuybyshev Hydroelectric Power Plant during spring floods.

Periodical : Met. i gidro., 1, 33-36, Ja - F 1955

Abstract : A method is suggested for the forecast of the amount of water discharge of the Volga river during spring floods at the Kuybyshev Hydroelectric Power Plant. A formula is given for the mean monthly amount of discharge (Q), allowing for the course of air temperature, the accumulation of snow, and the defined forested area, and connecting the amount of water in the river basin (W), the mean air temperature in the basin (t), and the coefficient (k) which characterizes the depth of the layer of melting snow. Formulae and 3 graphs.

AID P - 1435

Met. i gidro., 1, 33-36, Ja - F 1955

Card 2/2 Pub. 71-a - 9/23

Institution: Main Administration of the Hydrometeorological
Service at the Council of Ministers of the USSR

Submitted : No date

SAPOZHNIKOV, V. I.

AID P - 2606

Subject : USSR/Engineering

Card 1/1 Pub. 71-a - 9/26

Author : Sapozhnikov, V. I.

Title : ~~On prognosticating the Volga summer runoff at the~~
Kuybyshev Hydro-Power Plant

Periodical : Met i gidr, 4, 39-42, J1/Ag 1955

Abstract : A mathematical analysis of the Volga river runoff for the past 8 years. Two tables give statistical data for water conditions from June to August. The runoff should be rated in spring according to data on the amount of snow, and in summer according to average yearly precipitation. Two Russian references, 1952, 1954.

Institution : None

Submitted : No date

~~SAPOZHNIKOV, Vasilii Ivanovich; YASNOGORODSKAYA, M.M., redaktor; SHASTIN,
A.P., redaktor; BOLDVICHIK, A.A., tekhnicheskiy redaktor.~~

[Principles of flow forecasting based on water supply in river
systems] Osnovy prognoza stoka po zapasam vody v rechnoi seti.
Pod red. A.P. Shastina. Leningrad, Gidrometeor. izd-vo, 1956.
101 p. [Microfilm] (MIRA 10:6)
(Stream measurements)
(Hydrology)

SAPOZHNIKOV, V. I.

SE-129

Sapozhnikov V. I. K metodike prognoza stoka po sootvetstvuyemyi razlichnyam. (Method

Hydrologiya i Gidroyazhiv. Leningrad.

451-500.3 451-579

SAPOZHNIKOV, V. I.

USSR/Physics of the Hydrosphere - General Problems, N-1

Abst Journal: Referat ~~Zhur~~ - Fizika, No 12, 1956, 36245

Author: Rakhmanov, V. V., Sapozhnikov, V. I.

Institution: None

Title: On the Procedure for Aerial Photography of Snow Covers During the Time of Melting

Original
Periodical: Tr. Tsentr. in-ta prognozov, 1956, No 33, 95-106

Abstract: Notice is taken of the importance of data on the snow cover of basins during the melting period in the prediction of the elements of the spring high water, and of the advantages and objectivity of the aerial photography method, which makes it possible to investigate the dynamics of the descent of the snow cover under various physical and geographical conditions. It is indicated that the value of these materials becomes greater if they are supplemented by surface snow-measuring expeditions, carried out at the same time with the aerial photography. Based on the analysis of

Card 1/2

USSR/Physics of the Hydrosphere - General Problems, N-1

Abst Journal: Referat Zhur - Fizika, No 12, 1956, 36245

Abstract: materials of the aerial photography, carried out by the Central Institute of Forecasting in the spring of 1954, recommendations are given concerning what part of the area and in what locations of the basin it is necessary to photograph in order to obtain a material that describes fully enough the distribution of the snow cover over the entire basin.

Card 2/2

USSR/Physics of the Hydrosphere - General Problems, N-1

Abst Journal: Referat Zhur - Fizika, No 12, 1956, 36248

Abstract: method of forecasting, calculation tables, and a check of the effectiveness of the method, of the graphic relationships, and of the comparison.

Card 2/2

SAPozhnikov, V. I.

USSR/Physics of the Hydrosphere - Dynamics of Sea and Land Water, N-2

Abst Journal: Referat Zhur - Fizika, No 12, 1956, 36276

Author: Sapozhnikov, V. I.

Institution: None

Title: Concerning the Calculation of the Irregularity in the Arrival of Water Into the River Network in the Forecasting of the Runoff

Original

Periodical: Tr. Tsentr. in-ta prognozov, 1956, No 44, 30-37

Abstract: A method is proposed for taking into account the irregularity in the runoff over a territory, based on the analysis of the total inflow along the length of the river network and on the variation of the arrival-time distribution curve of the runoff plotted against the irregularities in the arrival of the water into the river network along its length. An equation is given to calculate the runoff in a closed loop and examples are given of calculations for the Volga and Kama

Card 1/1

SAPOZHNIKOV, V. I.
RAKHMANOV, V.V.; SAPOZHNIKOV, V.I.

Using aerial inspection for visual determination of the snow cover
in basins during the snow melt period. Meteor. i gidrol. no. 3:58-59
Mr. '57. (MLRA 10:5)

(Snow)

SAPOZHNIKOV, V.I.

Methodology of prognoses of summer flow of rivers. Trudy TSIP no. 50:
86-121 '57. (MIRA 10:8)

(Steam measurements)

SAP ZHUKOV, V.I.

Forecasting the flowoff volume by the water reserve in the river
system and the additional inflow. Trudy TSIP no. 59:29-43 '57.
(Rivers) (Runoff) (MIRA 11:4)

SAPOZHNIKOV, V.I.

~~Forecasting the decadal water supply flowing to the gates of the
Gorkiy hydroelectric Power Station. Trudy TSIP no.65:23-62 '58.~~

(MIRA 11:6)

(Gorkiy--Hydroelectric power stations)

SAPOZHNIKOV, V.I.

Water condition forecasts for regulated sections of rivers. Trudy
TSIP no.75:47-60 '58. (MIRA 11:11)
(Rivers)

3(7)

AUTHORS:

Sapozhnikov, V. I., Grechko, Ye. S.

SOV/50-59-1-8/20

TITLE:

The Forecast of the Water Inflow to the Reservoir of the Volga Hydroelectric Power Station imeni V. I. Lenin According to Corresponding Discharges and Intermediate Inflow (Prognoz pritoka v vodokhranilishche Volzhskoy GES imeni V. I. Lenina po sootvetstvennym raskhodam i promezhutochnomu pritoku)

PERIODICAL:

Meteorologiya i gidrologiya, 1959, Nr 1, pp 40-44 (USSR)

ABSTRACT:

There is a close connection, permitting the forecast of the supply of high waters, between the discharges at upper measuring points on the same isochrone and the discharge at a lower measuring point. With the length of the period for which the forecast is made, the intermediate inflow, i.e. the inflow from the moment of forecasting until the realization of the forecast, increases in importance. As the measuring points do not always lie on an isochrone to the lower measuring point, one can also work with equidistant measuring points, particularly in case of rivers in level country with an almost constant velocity of flow.

Card 1/2

The Forecast of the Water Inflow to the Reservoir of SOV/50-59-1-8/20
the Volga Hydroelectric Power Station imeni V. I. Lenin According to
Corresponding Discharges and Intermediate Inflow

The forecast curves established for the high water in 1951
were in good conformity with the real measurements. There are
2 figures and 3 Soviet references.

Card 2/2

SAPOZHNIKOV, V.I.

Forecasting the runoff of snow and rain waters during floods.
Sbor. rab. po gidrol. no.1:138-142 '59. (MIRA 15:2)

1. Tsentral'nyy institut prognozov.
(Runoff)

SAPOZHNIKOV, V.I.

Using overland-flow curves in runoff forecasting. Trudy TSIP
no.84:54-64 '59. (MIRA 12:9)
(Runoff)

SAPOZHNIKOV, V.I.

Forecasting the summer inflow of water at the Dnieper and Kuybyshev
Hydroelectric Power Stations. Sbor. rab. po gidrol. no.1:143-
147 '59. (MIRA 15:2)

1. Tsentral'nyy institut prognozov.
(Dnieper River--Runoff)
(Volga River--Runoff)

SAPOZHNIKOV, Vasilii Ivanovich; SHASTIN, A.P., otv.red.; BLINNIKOV,
~~L.V., red.; ZARKH, I.M., tekhn.red.~~

[Forecasting the streamflow of rivers in the Volga Basin by
channel storage and inflow into the drainage network] Prognozy
stoka rek v basseine Volgi po ruslovym zapasam vody i pritoku
v rechnuiu set'. Moskva, Gidrometeor.izd-vo (otd-nie), 1960.
288 p. (MIRA 14:4)

(Volga Valley--Hydrology)

SAPOZHNIKOV, V.I.; KLIMOVA, V.V.

Forecasting the streamflow of the Belaya River. Trudy TSIP no.105:
109-124 '60. (MIRA 14:1)
(Belaya River (Bashkiria)—Hydrology)

SAPOZHNIKOV, V.I.; KLIMOVA, V.V.

Five-day streamflow forecasts for the Aragva River at the village
of Zhinvani in spring and summer. Trudy TSIP no.113:60-70 '61.
(MIRA 14:9)

(Aragva River--Hydrology)

SAPOZHNIKOV, V.I.

Forecasting water discharge in the influx area during high water
in spring. Trudy TSIP no.117:74-83 '63. (MIRA 16'7)
(Oka River--Runoff)

SAPOZHNIKOV, V.I., kand. tekhn. nauk

Approximate method of calculating the irregularity of the
entry of water into a river network in runoff forecasts.
Meteor. i gidrol. no.9:28-33 S'64. (MIRA 17:9)

1. Tsentral'nyy institut prognozov.

SAPOZHNIKOV, V.I.; KLIMOVA, V.V.

Forecast of a ten-year inflow of water to the Nurek Hydro-
electric Power Station on the Vakhsh River. Trudy TSIP
no.13483-12 '64 (MIRA 1788)

1. SAPOZHNIKOV, V. K.
2. USSR (600)
4. Kirov Province - Bee Culture
7. Hybrid colonies in Kirov Province, Pchelovodstvo, 30, no. 4, 1953.

9. Monthly List of Russian Accessions, Library of Congress, April 1953, Uncl.

SAPOZHNIKOV, V.M.

Restoration of working capacity in closed fractures of the ungual phalanges
of the fingers and toes; data from industrial establishments. Khirurgiia
34 no.12:86-87 D '58. (MIRA 12:1)

(FINGERS AND TOES, fract.
closed, of ungual phalanges, ther. (Rus))

SAPCZHNIKOV, V. M.

Tailoring

Cutting out textile patterns by sections. Leg.prom. 12 No. 8 1952.

Monthly List of Russian Accessions, Library of Congress, October 1952. Unclassified.

SAPOZHNIKOV, V.M.

Bilateral apoplexy of the ovaries in conjunction with acute
appendicitis. Sov. med. 24 no. 7:129-130 J1 '60. (MIRA 13:8)

1. Iz khirurgicheskogo otdeleniya (zav. I.A. Shukhgalter) gorodskoy
bol'nitsy No 47 (glavnyy vrach A.A. Pavlova), Moskova.
(APPENDICITIS) (OVARIES--DISEASES)

RABINOVICH, L.A.; Primali uchastiye: SOKOLOV Ye.I.; SAPozhnikov, V.M.;
KHLyNTSEV, M.A.

Making forgings by pressing on horizontal forging machines. Kuz.-
shtam. proizv. 3 no.8:8-13 Ag '61. (MIRA 14:8)
(Forging machinery)

SAPOZHNIKOV, V.M. (Moskva, pos. Novo-Gireyevo, 6-y prospekt, d.34);
LEVINSON, O.S.

Perforation of an ulcer of the esophagus into the right common
carotid artery. Vest.khir. no.9:124-125 '61. (MIRA 15:3)

1. Iz khirurgicheskogo otdeleniya (zav. - I.A. Shukhgalter)
Moskovskoy gorodskoy bol'nitsy No.47.
(ESOPHAGUS—ULCERS) (CAROTID ARTERY—ULCERS)

SHASKOL'SKIY, B.V., kand. tekhn. nauk; SOTNIKOVA, K.F., inzh.;
GAVRILIN, Ye.F.; LUBKOV, A.N.; SAPOZHNIKOV, V.M.; ZHUCHENKO,
L.F.; CHIGIRINA, N.I., tekhnik; ZHARIKOV, I.P., inzh.;
CHERTISHCHEVA, A.Ye.; SHAPOVALOV, V.K., tekhnik; MOROZOV, A.M.,
inzh.; SLIVKO, S.V., tekhnik; CHERNAVSKIY, G.N., kand. tekhn.
nauk; STRUZHESTRAKH, Ye.I., inzh., ed.; EL'KIND, V.D., tekhn.
red.; DEMKINA, N.F., tekhn. red.

[General norms for time and machining conditions used in the
industry for machining on automatic lathes; mass, large-lot
and lot production] Obshchemashinostroitel'nye normativy vremeni
i rezhimov rezaniia na tokarno-avtomatnye raboty; massovoe,
krupnoseriinoe i seriinoe proizvodstvo. Moskva, Mashgiz, 1962.
271 p. (MIRA 15:12)

1. Moscow. Tsentral'noye byuro promyshlennykh normativov po trudu.
(Turning--Production standards)

GOLOVANENKO, S.A.; CHERNOV, A.N.; SAPOZHNIKOV, V.M.; SINITSYN, V.G.;
GULYAYEV, V.V.

Extrusion of bimetal shapes. Kuz.-shtam. proizv. 5 no.10:
7-9 0 '63. (MIRA 16:11)

SAPozhnikov, V.M., (Moskva, pos. Novo-Gireyevo, 6-y prospekt, d.34);
LEVINSON, O.S.

Perforation of an ulcer of the esophagus into the right common
carotid artery. Vest.khir. no.9:124-125 '61. (MIRA 15-3)

1. Iz khirurgicheskogo otdeleniya (zav. - I.A. Shukhgalter)
Moskovskoy gorodskoy bol'nitsy No.47.
(ESOPHAGUS--ULCERS) (CAROTID ARTERY--ULCERS)

SAPOZHNIKOV, V.M., inzh.

Possibilities and experience in conducting prospecting operations
in mines on a direct current. Izv. vys. ucheb. zav.; gor. zhur.
no.8:3-5 '64 (MIRA 18:1)

1. Sverdlovskiy gornyy institut imeni V.V. Vakhrusheva. Rekomen-
dovana kafedroy rudnoy geofiziki.

SHCHUKOLDIN, A.V., inzh.; SAPOZNIKOV, V.N.

USSR

Investigation of the performance of the terminal stages of the
AR-4-3 turbine. Teploenergetika 8 no.8:18-23 Ag '61.

(MIRA 14:10)

1. Kaluzhskiy turbinnyy zavod.
(Turbines)

L 11339-67 EWT(d)/EWT(m)/EWP(k)/EWP(w)/EWP(v) IJP(c) EM

ACC NRI: AP6029863

(N)

SOURCE CODE: UR/0096/66/000/009/0074/0078

AUTHOR: Filippov, G. A. (Candidate of technical sciences); Sapozhnikov, V. N. 4//
(Engineer; Dissertant)ORG: MEI-KTZ

TITLE: Investigation of the operation of a group of stages

SOURCE: Teploenergetika, no. 9, 1966, 74-78

TOPIC TAGS: turbine, turbine stage, turbine blade, turbine design

ABSTRACT: The results of investigations carried out on four groups of turbine stages with cylindrical and curved blades with relative heights of 0.3—0.7 are presented. It was found that the efficiency of the turbine flow section between the inlet and exit depends on the conditions of flow transition from one stage to another. The coefficient characterizing the utilization of the exit velocity was approximately equal to 0.86; it decreased sharply at relative velocities of 0.30—0.55. Recommendations for obtaining economical relative velocities and blade cascades as well as formulas for calculating the efficiency of individual turbine stages or blade cascades are given. Orig. art. has: 7 figures, 16 formulas, and 1 table.

SUB CODE: 21 / SUBM DATE: none / ORIG REF: 004/

Card 1/1 *sm*

UDC: 621.165.533.6.001.5

KADYROV, A.M.; SAPOZHNIKOV, V.S.; ARZUMANOV, Sh.P., redaktor.

[Using booster compressors in oil industry] Opyt primeneniia dozhimnykh kompressorov v neftianoi promyshlennosti. Moskva, Gostoptekhizdat, 1950. 43 p. (MIRA 8:4)
(Oil wells--Gas lift) (Compressors)

SAPOZHNIKOV, Vladimir Stepanovich; BARSHAY, G.S., red.; PETROVA,
Ye.A., vedushchiy red.; POLOSINA, A.S., tekhn.red.

[Repair of turbodrills] Remont ruboburov. Moskva, Gos.
nauchno-tekhn.isd-vo neft. i gorno-toplivnoi lit-ry,
1959. 94 p. (MIRA 12:7)
(Turbodrills--Maintenance and repair)

SAPOZHNIKOV, V. T., Cand Tech Sci — (diss) "Calculation of the stability of clearing edges of a rational section in mines," Lenin-grad, 1960, 22pp, 200 cop. (Sverdlovsk Mining Institute im V. V. Vakhrushev) (KL, 45-60, 126)

SAPOZHNIKOV, V.T., inzh.

Calculating levelled-off convex sides of open-pit mines. Izv. vys.
ucheb. zav. gor. zhur. no.8:15-22 '60. (MIRA 13:9)

1. Vsesoyuznyy nauchno-issledovatel'skiy marksheyderskiy institut.
Rekomendovana kafedroy marksheyderskogo dela.
(Strip mining)

SAPOZHNIKOV, V.T., inzh.

Modeling slopes. Izv. vys. ucheb. zav.; gor. zhur. no.9:39-
48 '60. (MIRA 13:9)

1. Ural'skiy filial Vsesoyuznogo nauchno-issledovatel'skogo
marksheyderskogo instituta. Rekomend. kafedroy marksheyder-
skogo dela Sverdlovskogo gornogo instituta.
(Engineering models) (Strip mining)

AKHTEROV, Iosif Samoylovich, arkhitekto~~r~~-khudozhnik; MILETITSKAYA, Feofaniya Romsnovna, arkhitekto~~r~~; SAPOZHNIKOV, Vladimir Vasil'yevich, inzh.; SVESHNIKOV, Oleg Aleksandrovich, kand. arkhitektury. Prinizimali uchastiye: KRYZHANOVSKAYA, A.S., arkhitekto~~r~~; ZAGAL'SKAYA, O.A., khudozhnik. MAL'CHEVSKIY, V., red.-sostavitel'; GARKAVENKO, L., tekhn.red.; GRISHKO, T., tekhn.red.

[Home furniture; design and construction manual] Mebel' dlia zhil'ia; posobie po proektirovaniu. Kiev, Gos.izd-vo lit-ry po stroit. i arkhit. USSR, 1960. 295 p.

(MIRA 14:4)

1. Akademiya stroitel'stva i arkhitektury USSR. Institut arkhitektury soorusheniy.
(Furniture)

SAPOZHNIKOV, V.V.

Use of hydrochemical characteristics for the isolation of the
Cromwell Current. Trudy Inst. okean. 79:87-96 '65.
(MIRA 18:8)

L 04651-67 EWT(m) JR

ACC NR: AP6024001

SOURCE CODE: UR/0201/66/000/002/0005/0011

33

AUTHOR: Shishkin, G. V.; Sapozhnikov, V. V.

ORG: Institute of Nuclear Physics AN BSSR (Institut yadernoy fiziki AN BSSR)

32

TITLE: Influence of higher harmonics on the behavior of a subcritical reactor

19 B

SOURCE: AN BSSR. Vestsi. Seryya fizika-tekhnichnykh navuk, no. 2, 1966, 5-11

TOPIC TAGS: subcritical reactor, nuclear reactor characteristic, reactor neutron flux, slow neutron, neutron diffusion

ABSTRACT: The author estimates the influence of the higher harmonics on the time behavior of a subcritical reactor by the two-group method of diffusion approximation, with allowance made for the effect of the delayed neutrons, which are unified in a single group with averaged parameters. The neutron-balance equations are solved by standard means and it is shown that at the frequencies at which pulsed reactors normally operate, an appreciable noise background exists in the reactor, resulting from the fact that the flux in the reactor does not have time to attenuate in the interval between pulses, and this noise accumulates in the course of time. Examples of calculated reactivities for each of the first eight harmonics, relative to the activities of the first harmonic, are presented for rectangular and cylindrical reactors. The higher harmonics are shown to attenuate more rapidly than the fundamental. Values of the background attenuation coefficients are also given. The numerical calculations show that in the case of small subcriticality the main contribution to the nonstation-

Card 1/2

L 04651-67

ACC NR: AP6024001

ary neutron flux excited in a subcritical reactor by individual pulses is made by the first harmonic, since its damping factor is at least one order of magnitude lower than that of the succeeding harmonic. However, allowance for the higher harmonics must be made in cases where large negative reactivities are involved. The authors thank Academician AN BSSR A. K. Krasin for interest in the work and a discussion of the results. Orig. art. has: 16 formulas and 2 tables.

SUB CODE: 20/ SUBM DATE: 01Feb66/ ORIG REF: 002/ OTH REF: 005

kh

Card 2/2

BRUNS, G.L.; GAVRILIN, Ye.F.; SAROSHNIKOV, V.Ye.

Equipment for measuring the temperature of ingot surfaces.
Metallurg 9 no.6:25-27 Js 64. (MIRA 1749)

1. Nauchno-issledovatel'skiy institut metallurgii i Orsko-Khalilovskiy kombinat.

SAPOZHNIKOV, Ya.N.

Developing the concept of metabolism in the zoology class. Biol.v
shkole no.4:39-45 J1-Ag '57. (MLRA 10:8)

1. Institut metodov obucheniya Akademii pedagogicheskikh nauk RSFSR.
(Metabolism--Study and teaching)
(Fishes--Physiology)

SAPOZHNIKOV, Ya.N.

Formation of metabolic concepts during the study of birds.
Biol. v shkole no.1:48-52 Ja-Y '59. (MIRA 12:2)

1. Michurinskiy pedagogicheskiy institut.
(Ornithology--Study and teaching) (Metabolism)

SAPOZHNIKOV, Yefim Nus'yevich, inzh.; RODIONOV, Vasilii Nikolayevich,
inzh.; GARASHCHENKO, Grigoriy Matveyevich, inzh.;
MAYBORODA, N.V., inzh., retsenzent;

[Manual for an amateur navigator] Posobie sudovoditeliu-
liubiteliu. Izd.2., perer. i dop. Kiev, Izd-vo "Tekhnika,"
1964. 277 p. (MIRA 17:5)

~~SP-11~~
SAPOZHNIKOV, Ya. Yu.

Averaging coals and oven charges in coking plants. V. G. Zashkvara, Ya. Yu. Sapozhnikov, and B. I. Cherkas- skaya. *Stal* 15, 871-9 (1955).—Deviation from an av- compn. of coals charged in ovens was detd. after spreading coals, as delivered by the railroad, in thin superimposed layers on the storage beds and then taking the coal from them with a grab bucket, placing coals in bunkers following dif- ferent practice; or in a coaling tower of 3000-ton capacity having four bunkers. Figures presented show that bedding averages the compn. the best, while bunkers and tower do not provide adequate mixing. J. D. Cat

(3)

SAPOZHNIKOV, Ya. Yu.

ARONOV, Samuil Grigor'yevich; BAUTIN, Ivan Grigor'yevich; VOLKOVA, Zoya Andreyevna; VOLOSHIN, Arkhip Il'ich; VIROZUB, Yevgeniy Vladimirovich; GARAY, Lev Izrailevich, DIDENKO, Viktor Yefimovich; ZASHKVARA, Vasilii Grigor'yevich; IVANOV, Pavel Aleksandrovich, KUSTOV, Boris Iosifovich [deceased]; KOTOV, Ivan Konstantinovich; KOTKIN, Aleksandr Matveyevich; KOMANOVSKIY, Maksim Semenovich; LEYTES, Viktor Abramovich, MOROZ, Mikhail Yakovlevich; NIKOLAYEV, Dmitriy Dmitriyevich. OBUKHOVSKIY Yakov Mironovich; RODSHTEYN, Pavel Moiseyevich; SAPOZHNIKOV, Yakov Yudovich, SEMICHENKO, Sergey Yefimovich; TOPORKOV, Vasilii Yakovlevich; CHERMNYKH Mikhail Sergeyeovich; CHERKASSKAYA, Esfir' Ionovna, SHVARTS, Semen Aronovich; SHERMAN, Mikhail Yakovlevich; SHVARTS, Grigoriy Aleksandrovich; LIBERMAN, S.S., redaktor izdatel'stva; ANDREYEV, S.P., tekhnicheskii redaktor

[Producing blast furnace coke of uniform quality; a collection of articles for the dissemination of advanced practices] Poluchenie domennogo koksa postoiannogo kachestva; sbornik statei po obmenu peredovym opytom. Khar'kov, Gos.nauchno-tekhn.izd-vo lit-ry po chernoi i tsvetnoi metallurgii, 1956. 300 p. (MLRA 9:8)
(Coke industry)

SAPOZHNIKOV, YA. YU.

ZASHKVARA, V.G., kandidat tekhnicheskikh nauk; SAPOZHNIKOV, Ya.Yu.

Coal averaging and the selection of a type of coal storage piles
for by-product coking plants. Koks i khim. no.7:12-16 '57.
(MIRA 10:7)

1. Ukrainskiy uglekhimicheskiy institut.
(Coal--Storage) (Coal preparation)

С.А. ПОЗДНИКОВ, Я. Ю.

68-8-: /23

AUTHOR: Miroshnichenko, A. M., Senichenko, S. Ye., and Sapozhnikov, Ya. Yu.

TITLE: Coking of Stamped Charges. (Koksovaniye trambovannykh shicht)

PERIODICAL: Koks i Khimiya, 1957, No.8, pp. 10-12 (USSR)

ABSTRACT: Results obtained in 1952-53 on coking stamped charges from experimental and works blends are given. Properties of coals and the composition of blends used are given in tables 1 and 2 respectively. Coking conditions and properties of coke produced are shown in table 3. It was found that stamped charging of blends containing low rank coals improves the quality of the coke produced. There are 3 tables and 2 references, both of which are Slavic.

Card 1/1

ASSOCIATION: UKhIN

AVAILABLE: Library of Congress

SAPOZHNIKOV, Ye.; ROMANOV, N.; MAKAROV, V., redaktor; MUNTJAN, T.,
tekhnicheskij redaktor.

[Learn to fly a glider] Uchis' letat' na planere. Moskva, Izd-vo
Dosaaf, 1954. 94 p. [Microfilm] (MLRA 8:2)
(Gliders (Aeronautics)--Piloting)

Sapozhnikov, Ye.

Subject : USSR/Aeronautics AID P - 1007
Card 1/1 Pub. 58 - 8/16
Author : Sapozhnikov, Ye., Master of Sport
Title : ~~USSR/Aeronautics~~ Towing gliders by aircraft on short line
Periodical : Kryl. rod., 1, 13, Ja 1955
Abstract : Normally gliders are towed by aircraft with a steel cable 80-100m long. The author lists disadvantages of this method and suggests a short (45-50m) cable.
Institution : None
Submitted : No date

AID P - 2224

Subject : USSR/Aeronautics

Card 1/1 Pub. 58 - 7/19

Author : Sapozhnikov, Ye.

Title : Soaring flights in streamline flows

Periodical: Kryl. rod., 5, 11-12, My 1955

Abstract : The author states that the organization of soaring in ascending air currents along mountain slopes is not sufficiently developed. He explains necessary conditions for soaring, mentions the gliders A-1, A-2, and BRO-9 and suggests methods of training. Diagrams.

Institution: None

Submitted : No date

SAPPOZHNIKOV, Ye

AID P - 2849

Subject : USSR/Aeronautics

Card 1/1 Pub. 58 - 8/19

Author : Sapozhnikov, Ye.

Title : ~~Czechoslovak glider LF-107~~ "Lunyak"

Periodical : Kryl. rod., 9, 15, S 1955

Abstract : The author gives specifications and flight characteristics of a single seater, series-produced glider.
Photo.

Institution : DOSAAF

Submitted : No date

AID P - 4704

Subject : USSR/Aeronautics - Aircraft (gliders)

Card 1/1 Pub. 58 - 16/17

Author : Sapozhnikov, E., Master of Sports

Title : The Czechoslovak glider "Pioneer" LF-109

Periodical : Kryl. rod., 5, 22, My 1956

Abstract : The author describes summarily the construction and the equipment of the Czechoslovak glider "Pioneer" LF-109, and indicates some of its special features. The maneuverability of the glider is discussed in detail. The author gives also basic figures concerning the design and the characteristics of the aircraft. 1 photo and 1 design.

Institution : None

Submitted : No date

~~SAPOZHNIKOV~~, Ye., master sports.

Towing gliders behind an airplane with a short line. Kryl.rod.
6 no.l:13 Ja '55. (MIRA 8:3)
(Gliders(Aeronautics))

SAPOZHNIKOV, Yevgeniy Vasil'yevich; VASIL'YEV, A.A., redaktor; TSIGEL'MAN,
L.T., tekhnicheskiy redaktor

[Learn how to fly gliders] Uchis' letat' na planere. Moskva,
Izd-vo DOSAAF, 1957. 149 p. (MIRA 10:8)
(Gliding and soaring)

SAPOZHNIKOV, Yevgeniy Vasil'yevich; GRIGOR'YEVA, A.I., red.; ANDRIANOV,
B.I., tekhn.red.

[Acrobatic flights in a glider] Figurnye polety na planere.
Moskva, Izd-vo DOSAAF, 1959. 61 p. (MIRA 13:4)
(Gliding and soaring)

SAPOZHNIKOV, Yefim Nus'yevich [Sapozhnykov, IU.N.]; LUPANDIN, I., red.;
GORKAVENKO, L. [Horkavenko, L.], tekhn.red.

[Czechoslovakian diesel engines] Chekhoslovats'ki dyzeli.
Kyiv, Derzh.vyd-vo tekhn.lit-ry URSR, 1960. 115 p.

(MIRA 14:2)

(Czechoslovakia--Diesel engines)

69743

S/085/60/000/05/013/053
D001/D005

4(6)

1,6000

AUTHOR: Sapozhnikov, Ye., Master of Sport

TITLE: The All-Metal L-13 "Blanik" Glider⁴

PERIODICAL: Kryl'ya rodiny, 1960, Nr 5, pp 12-13 (USSR)

ABSTRACT: The author describes the Czechoslovakian L-13 "Blanik" glider and discusses the techniques involved in take-off under tow or with the assistance of a winch, free flight and flight within a prescribed area. The glider is of the cantilever, high-wing type with a tandem seating arrangement. The craft has lever and pedal controls, and the instrument panels are equipped with 2 speedometers, 2 electrical rev counters, 2 ± 5 m/sec variometers, 2 compasses, 2 altimeters graded up to 10 km and 1 ± 15 m/sec variometer. The glider's characteristics are as follows:
- wing span 16.2 m; length 8.4 m; height 2.09 m; width

Card 1/3

69743

S/085/60/000/05/013/053
D001/D005

The All-Metal L-13 "Blanik" Glider

of fuselage 0.62 m; height of fuselage 1.14 m; wing area 19.15 m²; wing aspect ratio 13.7; upward dihedral 30; forward sweep of wing 50; width of wing at fuselage 1.665 m; width of wing cantilever 0.71 m; base wing profile NACA 63₂ A-615; wing tip profile NACA 63₂ A-612; aileron area 2.31 m²; wing flap area 3.95 m²; braking flap area 0.648 m²; stabilizer span 3.45 m; area of stabilizer 1.545 m²; area of elevator 1.00 m²; horizontal tail surface area 2.66 m²; area of elevator tab 0.116 m²; vertical tail surface area 1.608 m²; flying weight with 2 pilots 472 kg; flying weight with 1 pilot 382 kg; maximum permissible flying weight 500 kg; normal load 24.7 kg/m²; maximum load 26.1 kg/m²; rate of descent at 78 km/hr 0.8 m/sec; rate of descent at

Card 2/3

69743

S/085/60/000/05/013/053
D001/D005

The All-Metal L-13 "Blanik" Glider

100 km/hr-1.1 m/sec; maximum possible gliding speed
240 km/hr; maximum permissible speed with winch
100 km/hr; optimum gliding speed 85 km/hr; minimum
gliding speed with wing flaps down and 2 pilots
55 km/hr. Take-off under tow by a Yak-12 corresponds
to the take-off of a KAI-12 glider. Winch assisted
take-off requires the use of a "Gerkules-3" winch
and a piloting technique like that for the "Primorets"
glider. Landing the "Blanik" demands a technique si-
milar to that for landing the KAI-12 and the "Pioner".
There is 1 diagram and 1 graph.

Card 3/3

SAPOZHNIKOV, Yevgeniy Vasil'yevich; GRIGOR'YEVA, A.I., red.; KOROLEV, A.V., tekhn. red.

[Learn to fly a glider] Uchis' letat' na planere. Izd.3., dop. i perer. Moskva, Izd-vo DOSAAF, 1961. 197 p. (MIRA 15:4)
(Gliding and soaring)

SAPOZHNIKOV, Ye., inzh.

Diesel engine manufacture in the Czechoslovakian Socialist
Republic. Mor.flot 21 no.1:41-43 Ja '61. (MIRA 14:6)
(Czechoslovakia--Diesel engines)

SAPOZHNIKOV, Ye., inzh.

Cargo motorship-platform "Zaporozhye." Rech.transp. 21 no.11:45
N '62. (MIRA 15:11)

(Freighters)

SAPOZHNIKOV, Yefim Nus'eyevich, inzh. Prinsipal uchastiye
KIRAKOVSKIY, N.F., dots.

[Internal combustion engines; manual for the operator]
Dvigateli vnutrennego sgoraniia; posobie motoristu. Kiev
Tekhnika, 1965. 306 p. (MIRA 18:7)

MUNVEZ, M.N., ratsionalizator; CHEREPAKHOV, I.L., ratsionalizator;
SAPOZHNIKOV, Ye.I., ratsionalizator

Device for welding steel band saws. Suggested by M.N.Munvez,
I.L.Cherepakhov, Ye.I.Sapozhnikov. Rats.i izobr.predl.v stroi.
no.8:129-130 '58. (MIRA 13:3)

1. Po materialam tresta No.4 Ministerstva stroitel'stva
BSSR.

(Electric welding--Equipment supplies)
(Band saws)

SAPOZHNIKOV, Yefimov Nus'yevich; RODIONOV, Vasiliy Nikolayevich;
~~GARASHCHENKO~~, Grigoriy Matveyevich; TANCHAROVA, V., red.;
SYCHUGOV, V., tekhn. red.

[Manual for an amateur boating enthusiast] Posobie sudovo-
diteliu-liubitelu. Kiev, Gos. izd-vo tekhn. lit-ry, 1961.
215 p. (MIRA 15:3)

(Boats and boating)

SAPOZHNIKOV, Ye.N.

Diesel freighter "Zaporozh'E" with a freight platform on deck.
Biul.tekh.-ekon.inform.Gos.nauch.-issl.inst.nauch.i tekhn.inform.
no.3:61-63 '62. (MIRA 15:5)

(Freighters)

AUTHORS: Priselkov, Yu.A., Sapozhnikov, Yu.A. and Tsepilyayeva, A.V. SOV/180-59-1-20/29
(Moscow)

TITLE: Pressure of Saturated Aluminium Vapour (Davleniye
nasyshchennogo para alyuminiya)

PERIODICAL: Izvestiya Akademii nauk SSSR, Otdeleniye tekhnicheskikh
nauk, Metallurgiya i toplivo, 1959, Nr 1, pp 106-109 (USSR)

ABSTRACT: The authors describe their measurements of the pressure of saturated aluminium vapour in the range 1273-1473°K by an integral variant of the effusion method. 99.998% pure aluminium was used. The apparatus (Fig 1) was of a continuous-action type with the special feature of a high-vacuum valve which enables the vapour-receiver to be replaced without disturbing the vacuum or stopping the heating. In the effusion chamber (Fig 2) evaporation of aluminium was effected in a beryllium-oxide crucible covered with a refractory disc (ground to fit and pressed down by the force of springs) with the effusion aperture. The crucible was contained in a massive molybdenum block and heated by high-frequency currents. Measures were taken to secure temperature uniformity and to minimise the effect of the h.f. on the effusion process. Temperatures were measured with thermocouples calibrated

Card 1/2

Pressure of Saturated Aluminium Vapour SOV/180-59-1-20/29

by placing metals of known melting point in the crucible. From the results (Table) it was found by the method of least squares that the logarithm of the vapour pressure (mm Hg) is equal to $9.2776 - 16079/T$, where T is the absolute temperature in °K. These results were in good agreement with those of other workers (Refs 1 and 2). The calculated value of the standard heat of evaporation was 74720 ± 310 cal/mole. The author has also calculated the degree of dissociation of the vapour for each experiment (Table), the mean value being 0.976.

Card 2/2 There are 3 figures, 1 table and 4 references, 3 of which are English and 1 German.

SUBMITTED: July 31, 1958

PRISELKOV, Yu.A.; SAPOZHNIKOV, Yu.A.; TSEPLYAYEVA, A.V.; KARELIN, V.V.

On the accuracy of the effusion method. Determination of indium saturated vapor pressure. *Izv.vys.ucheb.zav.;khim. i khim.tekh.* 3 no.3:447-451 '60. (MIRA 14:9)

1. Moskovskiy gosudarstvennyy universitet imeni M.V. Lomonosova, kafedra neorganicheskoy khimii.
(Indium) (Vapor pressure)

68695

5.2400(A)

S/180/60/000/01/019/027
E071/E135

AUTHORS: Priselkov, Yu.A., Sapozhnikov, Yu.A., and
Tseplyayeva, A.V. (Moscow) 1

TITLE: Measurement of Saturated Vapour Pressure of Boron 21

PERIODICAL: Izvestiya Akademii nauk SSSR, Otdeleniye tekhnicheskikh
nauk, Metallurgiya i toplivo, 1960, Nr 1, pp 134-137 (USSR)

ABSTRACT: The results of measurement of vapour pressure of boron within temperature range 1651-1764 OK by the effusion method are reported. The experimental method and apparatus used were described previously (Refs 1-5). Specimens of boron were of 99.42% purity and contained less than 0.16% of hydrogen. The evaporation was done from a molybdenum vessel covered with a diaphragm from molybdenum or tantalum. The diameter of the effusion hole was varied from 0.09 to 3.1 mm. The experimental results are given in Table 1. The vapour pressure and heat of sublimation (Table 2) were calculated by the usual method (Ref 7) assuming that boron in the vapour phase is monoatomic. The vapour pressure was found to be dependent on the ratio $S/K\sigma$ (the ratio of the evaporation surface S to the product of the surface

Card
1/2

L 10677-65 EWT(m)/EPF(c) Pr-4 SSD/AFTC(p)/AFWL JW

ACCESSION NR: AP4047648

S/0189/64/000/005/0074/0076

AUTHORS: Priselkov, Yu. A. ; Sapozhnikov, Yu. A. ; Tseplyayeva, A. V.

TITLE: Measuring vapor pressure ^{om} by the Knudsen method B

SOURCE: Moscow. Universitet. Vestnik. Seriya 2. Khimiya, no. 5, 1964, 74-76

TOPIC TAGS: vapor pressure, Knudsen method

ABSTRACT: When the walls of an effusion chamber cannot be made of the material being investigated, they may be constructed of material that does not interact chemically with the test substance and that has a vapor pressure (in the investigated temperature interval) lower than the test substance. The authors designed a molybdenum effusion chamber with a movable floor that can be shifted up to the effusion aperture or lowered to a depth of 36 mm. A disk of silver with radioactive Ag^{110} added was placed on this floor. The floor was set in one position and a half-hour exposure was made. The floor was then moved and another exposure made. The rate of effusion was measured by the radioactive condensate. When the silver disk on the floor of the chamber lay within the aperture angle (50° for this experiment),

Card 1/2

L 10677-65

ACCESSION NR: AP4047648

the effusion rate remained constant. When the depth in the chamber was increased, the solid angle at which evaporation occurred from the surface of the disk decreased, and the angle at which evaporation took place from the unsaturated lateral walls of the chamber increased. In order to avoid holding the chamber at high temperatures for a prolonged time for saturating the walls with the test material, it is advisable to choose a geometry for the chamber that will permit detection of only that part of the molecular beam (penetrating the aperture) that is limited by the angle including the surface of the test substance. This is done by introducing a supplementary collimating diaphragm. The formula necessary for computing vapor pressure by the Knudsen method, using this setup, becomes

$$P_{\mu\mu} = 17,14 \frac{2\pi}{\omega} G \sqrt{\frac{T}{M}}$$

where ω is the solid angle within which the molecules of the test substance may fall directly from the recess of the chamber upon the detector. The remaining symbols are standard. Orig. art. has: 2 figures and 1 formula.

ASSOCIATION: Moskovskiy universitet (Moscow University)

SUBMITTED: 15Mar64

ENCL: 00

SUB CODE: ME
Card 2/2

NO REF SOV: 002

OTHER: 003

SAPOZHNIKOV, Yu.P.; MARKOVSKIY, L.Ya.

Composition and certain properties of mercury selenite.
Zhur. neorg. khim. 10 no.6:1399-1401 Je '65.

(MIRA 18:6)

1. Gosudarstvennyy institut prikladnoy khimii.